The journal comes out monthly and usually contains about a dozen articles. Considering the breadth of the field it is covering, this means that the editors can be fairly selective, which should help to maintain high standards. Moreover, each issue of the journal is fairly digestible which is not always the case with vast depositories of information such as *Brain Research*. A second attractive feature is that papers are accepted and published quite rapidly (six to nine months) which is reasonable compared to other journals. JN is also quite affordable, being \$60 in 1982 for non-members of the Society for Neuroscience which is good value.

Cellular and Molecular Neurobiology

One shortcoming of the journal is in the reproduction of plates. In an area where the publication of micrographs is often necessary, JN can be said to do an adequate job but in this respect it is inferior to the superb production of *Neuroscience*. With this one reservation, JN is highly recommended; I am sure it will flourish.

The aims of *Cellular and Molecular Neurobiology* (CMN) are quite different from those of JN. This journal restricts itself to publishing papers analysing neuronal and brain function at the "cellular and subcellular" levels. There is indeed room for a specialized journal in this area.

CMN has had a fairly modest beginning, restricting itself to four issues per year each of which contains six to eight fairly short papers and a couple of short communications. The journal will also publish solicited and unsolicited review articles. The one example of a review to appear so far on "Aminergic Neurons: State Control and Plasticity in Three Model Systems" was quite worthwhile. An attractive feature of the journal is the extremely fast publication time, full papers taking from four to six months from receipt to publication.

A survey of the five issues available for review indicates that most of the articles deal with neuronal biochemistry, receptorology and neurochemistry with a few papers on electrophysiology. The general scientific quality appears to be reasonable and the level of interest fairly high. Although I do not think that as yet the journal is seen by most researchers as the prime target for their work, it holds promise and might be considered by authors in this subject area. Given the modest price this same group might also wish to subscribe. Those in other areas of neurobiology will probably prefer to wait and see how the journal develops. □

Richard Miller is Professor of Pharmacological and Physiological Sciences and Neurobiology at the University of Chicago.

Paradigms of the paranormal

David Cohen

Psychoenergetics: The Journal of Psychophysical Systems. Editor D.F. Lawden. 4/yr. (Gordon & Breach.) £69, \$125.

MOST scientists seem to assume that telepathy, clairvoyance, astrology, metal-bending by mind and other strange phenomena that go bump in the night are nothing but occult bunk. The psychologist Hans Eysenck, no fan of freak beliefs, has recently argued that to refuse to look at the evidence for paranormal claims is itself irrational — and quite unscientific. So the existence of a journal such as *Psychoenergetics* should, in theory, be justifiable.

The journal has recently been revamped, with a change of title (from *Psychoenergetic Systems*) and of editor. It aims to cover work into "any assembly of elements whose behaviour cannot be explained by appeal to the known physical modes of interactions. . .". If mind does affect matter, this is a journal to report it in.

The range of articles is wide, covering most of parapsychology and some physics. Speculative pieces review the nature of time, the nature of consciousness and the

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nature of the observer. For instance, John Valentine develops an interesting comparison between the behaviour of quantum mechanical electrons in solids and the characteristics of consciousness, although his model of consciousness seems to involve little memory and self-awareness.

Many papers, unfortunately, do not reach such a high standard. A 30-page paper investigates the Zen claim that "big minds" are all connected, and the author, Grinberg-Zylberbaum, offers a startlingly literal interpretation of this Zen metaphor about empathy. If "big minds" are all connected, he claims that there must (i) be brain waves travelling from my brain to yours, assuming we have "big minds", and (ii) if two people with "big minds" are together, their EEG records will be similar. The experiments to test these hypotheses involved training subjects to a high pitch of empathy and measuring their EEGs. The paper reports no control group, shows no awareness of experimenter effects and little sense of a literature which suggests that researchers are apt to read EEG records in ways that fit their hypotheses. Moreover, why should empathy mean identical brain waves?

I am sorry to sound stuffy, but precisely because the area is controversial research needs to be meticulous in its methodology. The contributors to *Psychoenergetics* seem curiously unaware of many interesting methodological issues raised by research into the paranormal.

The Society of Psychical Research publishes a technical learned journal, and it is hard to see how *Psychoenergetics* either improves on that or fills a different niche. Despite this criticism, the field of parascience is lively at present and it would not be unreasonable to recommend taking the journal if it were modestly priced. But at £65 for four issues (in 1982) it is super-naturally expensive. □

David Cohen is Editor of *Psychology News*.

Mind matters

Stuart Sutherland

Cognition and Brain Theory. Editor M.H. Ringle. 4/yr. (Lawrence Erlbaum.) \$18 US, \$27 elsewhere (personal); \$50 US, \$59 elsewhere (institutional.)

OLD journals never die, nor unfortunately do they fade away. That does not prevent new ones emerging, each with a defensive proclamation declaring that it "meets a need". Among other such splendidly hackneyed phrases in the editorial of the first issue of *Cognition and Brain Theory* are: "There is a growing awareness that effective research . . . requires a cooperative, multidisciplinary perspective", "Intended to provide the flexibility necessary for the publication of speculative multidisciplinary research", "The intellectual climate toward this type of innovative study has grown warmer", and "Help to bridge the gap".

The disciplines with which the journal is concerned are philosophy, psychology, linguistics, artificial intelligence and neuroscience, though no paper on the last subject appeared in the 1981 volume, unless one counts as neuroscience an unfinished computer model for detecting optic flow. Several articles merely regurgitate their authors' previous ideas. Thus Chomsky proclaims once more that there are innate mechanisms underlying language acquisition, and Pribram, innocent of any understanding of what vision or hearing must actually compute, yet again hails the hologram as the answer to how the brain works, and indeed to everything else including medicine, economics and politics.

Most of the articles are sensible if not very exciting. They deal mainly with conversation, planning and speech understanding. Almost none of the papers on artificial intelligence and computer simulation is based on a working program and where there is a program, the reader is told